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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/017,658	12/12/2001	Scott Demer	400.105US01	7933

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LEFFERT JAY & POLGLAZE, P.A.
P.O. BOX 581009
MINNEAPOLIS, MN 55458-1009

EXAMINER

NGUYEN, TAN

ART UNIT PAPER NUMBER

2818

DATE MAILED: 01/15/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/017,658

Applicant(s)

DERNER ET AL

Examiner

Tan T. Nguyen

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 02 December 2002.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-4, 8-17, 21 and 22 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 9-13 is/are allowed.
- 6) ☒ Claim(s) 1-4, 8, 14-17, 21 and 22 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____
- 4) ☐ Interview Summary (PTO-413) Paper No(s). _____
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other:

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1. The following action is in response to the amendment filed by Applicants on December 2, 2002.
2. Claims 5-7 and 18-20 have been canceled.
Claims 1-4, 8-17 and 21-22 are pending.
3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

4. Claims 1-4, 8, 14-16, 17, 21-22 are rejected under 35 U.S.C. 102(b) as being anticipated by Takasugi (U.S. Patent No. 5,663,906).

Takasugi disclosed in figure 1 a semiconductor memory device comprises a memory array [10] (column 3, line 57). The memory cell array [10] is made up of a plurality of subarrays [10₁-10_n]. Further, the memory cell array [10] comprises a DROM (DRAM and ROM) unit [10A] comprised of memory cells which serve as volatile memory (DRAM) (column 9, lines 58-59, 63 to column 10, line 5), and memory cells serve as a non-volatile memory (ROM) (column 3, line 66 to column 4, line 5). Takasugi further disclosed each of the subarrays [10₁-10_n] includes a pair of complementary bit lines [BL_i,/BL_i] (column 4, line 7) coupled to the memory cells and a sense amplifier [12_i] (column 4, line 29).

Regarding claim 2, Takasugi disclosed the ROM cells [11_{1,1}, 11_{2,1}, 11_{5,1}, 11_{6,1}] are ROM cell having transistors coupled to either the bit line [BL_i] or [/BL_i], and the gate of

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the ROM cells [11_{1,i}, 11_{2,i}, 11_{5,i}, 11_{6,i}] and the gate of the DRAM cells [11_{3,i}, 11_{4,i}] are coupled to different word lines [WL₁-WL₆].


Regarding claims 3-4, 8, 15-16, 21-22, Takasugi disclosed that the ROM cells are coupled to either the bit line [BL_i] which carries potential V_{cc}, or bit line [/BL_i] which carries potential V_{ss}.

5. Applicant's arguments with respect to claims 1-4, 8, 14-17 and 21-22 have been considered but are moot in view of the new ground(s) of rejection.

6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Tan T. Nguyen whose telephone number is (703) 308-1298. The examiner can normally be reached on Monday to Friday from 07:00 AM to 03:00 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, David C. Nelms, can be reached on (703) 308-4910. The fax phone number for the organization where this application or proceeding is assigned is (703) 308-7724.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0956.



Tan T. Nguyen
Primary Examiner
Art Unit 2818
January 08, 2003